

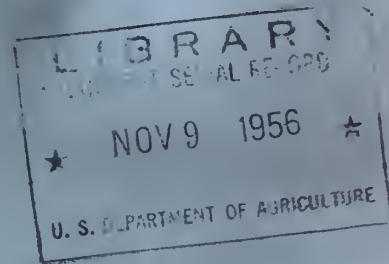
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Federal - State Cooperative
Snow Surveys and Water Supply Forecasts
for

Rio Grande Drainage Basin



SOIL CONSERVATION SERVICE
UNITED STATES DEPARTMENT OF AGRICULTURE
AND
COLORADO AGRICULTURAL EXPERIMENT STATION

Data included in this report were obtained by the agencies named above in cooperation with the U S. Forest Service, National Park Service, State Engineers of Colorado and New Mexico and other Federal, State and local organizations.

AS OF
FEB. 1, 1954

UNITED STATES DEPARTMENT OF AGRICULTURE
SOIL CONSERVATION SERVICE

TO RECIPIENTS OF COOPERATIVE SNOW SURVEY
AND WATER SUPPLY FORECAST REPORTS:

Forecasts by U. S. Weather Bureau of total annual streamflow October-September, inclusive, at more than 300 gaging stations are issued monthly January through May in the publication **WATER SUPPLY FORECASTS FOR THE WESTERN UNITED STATES**.

Weather Bureau forecasts of runoff presented in that bulletin are computed from procedures based on mathematical analysis of the relation between precipitation and runoff.

The Weather Bureau bulletins may be secured by writing to:

Hydrologist in Charge
River Forecast Center
U. S. Weather Bureau
711 Federal Office Building
Kansas City 6, Missouri

For current information on local river and flood conditions, reference should be made to the appropriate River District Office listed below:

Meteorologist in Charge:	Pecos River in N. Mex.;
Weather Bureau Airport Station Albuquerque, N. Mex.	Rio Grande and tributaries at and above Elephant Butte Dam, N. Mex.

Rio Grande

FEDERAL-STATE COOPERATIVE
SNOW SURVEY AND WATER SUPPLY
FORECASTS
FOR
RIO GRANDE

Report Prepared
by
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and
-
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Soil Conservation Service
Colorado Experiment Station
Fort Collins, Colorado

General Series Paper No. 559
Colorado Agricultural Experiment Station

WATER SUPPLY OUTLOOK
RIO GRANDE AND CANADIAN DRAINAGE BASINS
FEBRUARY 1, 1954

The water supply outlook for the Rio Grande in Colorado and New Mexico is far below normal stream flow during the 1954 season. Snow accumulation to February 1 is about 80 percent of normal at higher elevations and much less at lower elevations. The most probable summer flow of the Rio Grande is about 75 percent of normal in San Luis Valley and less in percent of normal in New Mexico. These estimates are subject to considerable revision as the season advances but the chances that summer flow will be above normal in New Mexico is about one in ten. Soil moisture conditions are fair in San Luis Valley and poor along the Rio Grande in New Mexico.

Snow accumulation in the mountains surrounding San Luis Valley is about 80 percent of normal to February 1, 1954. This is the case on both the Continental Divide and Sangre de Cristo ranges. Fall precipitation was much below average. Soil moisture in the mountains is dry but possibly better than a year ago. Due to recent snow at valley elevations soil moisture conditions in the valley are relatively good. Stream flow is below normal. The current outlook for below normal streamflow could change materially if precipitation and snowfall is above normal from now till May 1. The winter flow of the Rio Grande is below average. Carryover storage in irrigation reservoirs is much below average and February 1, 1953.

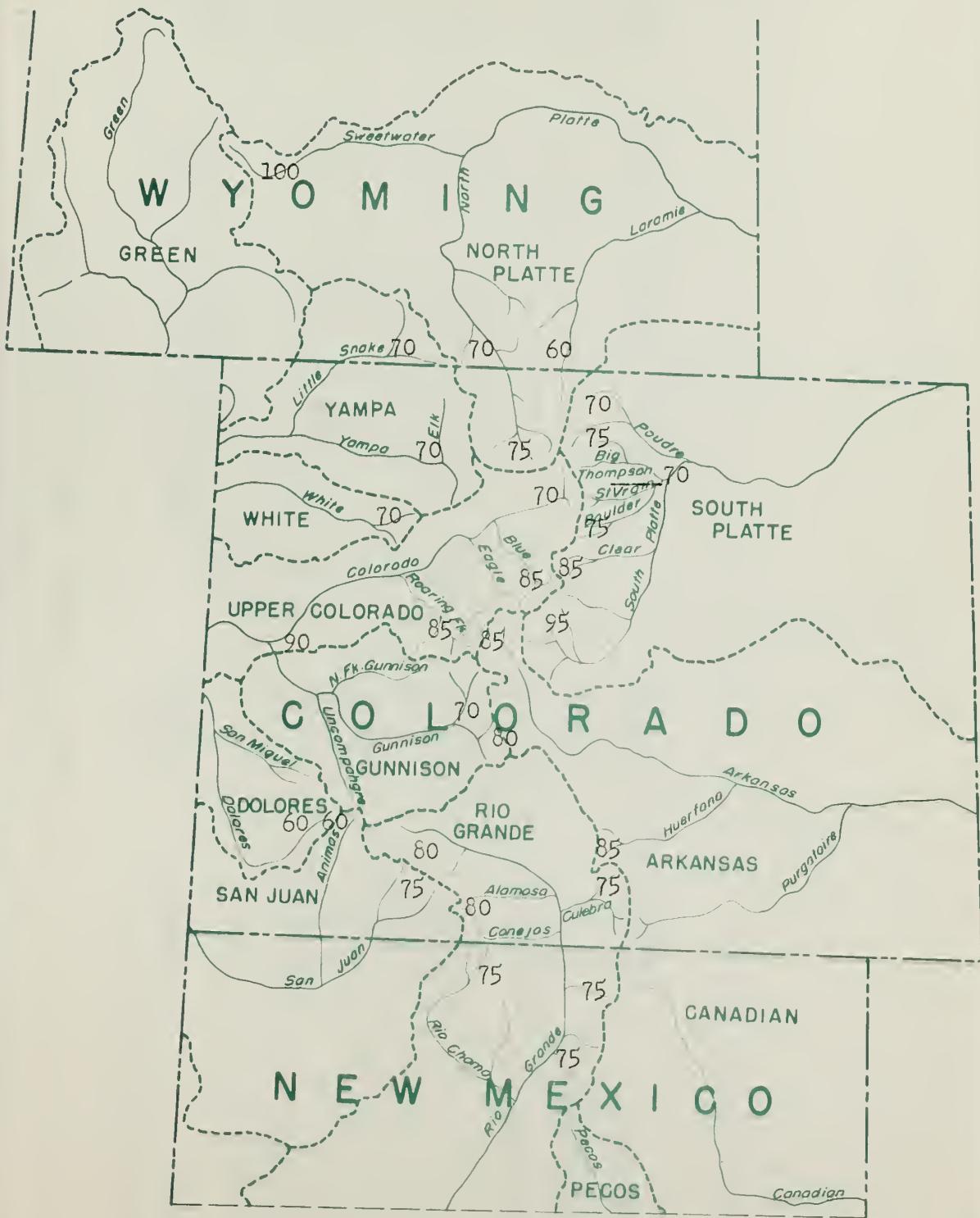
Snow cover in Northern New Mexico is similar to San Luis Valley except for practically no snow at lower elevations. Soil both at mountain and valley elevations are dry. Current stream flow into the Middle Rio Grande area in New Mexico is well below normal. The water supply available to the Middle Rio Grande area will be extremely limited in 1954 unless there is an unusual increase in rate of snow accumulation during the next few months. El Vado reservoir is empty.

Storage in Elephant Butte and Caballo reservoirs now totals 144,000 acre feet which is about 1/3 of February 1, 1953 and actually low in view of the current water supply outlook. This storage also restricts water use above the reservoir. Soil moisture conditions in the lower Rio Grande Valley are poor. Stream snow cover on the headwaters of the Pecos river is very low at about 60 percent of average. However, snow melt on this stream affects stream flow only a short distance from the mountains. Soil moisture conditions are poor on the Carlsbad project.

On Canadian River tributaries snow cover is near normal. Soil moisture conditions on the Tucumcari irrigated area are reported as poor. Stream flow is below average. Storage in Conchas reservoir is now 68,800 acre feet as compared to 75,700 a year ago and 314,000 acre feet as average.

WATER CONTENT OF SNOW ON THE WATERSHEDS OF
PLATTE, ARKANSAS, UPPER COLORADO AND RIO GRANDE BASINS
BASED ON SNOW SURVEYS MADE APPROXIMATELY FIRST DAY OF MONTH

In Percent of Normal
February 1, 1954



SNOW SURVEYS AND IRRIGATION WATER FORECASTS
RIO GRANDE BASIN

STATUS OF RESERVOIR STORAGE, February 1, 1954

STREAM	RESERVOIR	USABLE CAPACITY 1000 A.F.	THOUSANDS OF ACRE FEET IN STORAGE				10-year Ave. 1942-1951
			1954	1953	About Feb. 1 1952	1951	
RIO GRANDE	Rio Grande	45.0	4.7	15.3	5.3	2.8	15.9
	Santa Maria	45.0	2.1	9.4	1.9	2.2	11.0
	Sanchez	103.0	2.9	4.8	3.1	2.8	13.4
	Terrace	17.7	1.2	4.6	1.9	1.3	3.1
	Continental	26.7	4.0	4.5	2.5	2.8	9.4
	Platoro	60.0	0.0	0.0	0.0	0.0	—
	Elephant Butte	2273.7	128.6	355.0	37.4	309.8	963.9
	Caballo	365.0	15.9	61.8	44.5	117.9	227.2
	Ej. Vado	226.0	0.0	8.2	0.0	31.0	73.8
	Conchas	600.0	68.9	75.7	118.6	195.1	314.3
CHAMA RIVER	Alamogordo	148.0		30.0	22.0	103.0	64.6
	McMillan-Avalon	45.0		2.5	2.5	9.4	15.3
CANADIAN RIVER							
PECOS RIVER							

*Some for shorter periods.

SNOW SURVEYS AND IRRIGATION WATER FORECASTS
for

RIO GRANDE BASIN
February 1, 1954

SUMMARY OF FEBRUARY 1 SNOW SURVEYS AND COMPARISON OF DATA WITH THAT OF PREVIOUS YEARS BY WATERSHEDS

WATERSHEDS	Snow Depth 1954 Inches	Snow 1954 1953	Water Content in Inches 16 yr. * Avg.	No. of courses in Avg.	Snow Density 1954 Percent	1954 Water Content in percent of	
						1953	16 yr. Avg. *
Rio Grande (Colo.)	24.5	5.9	6.0	15.6	6.8	11	25
Upper Rio Grande	32.6	7.0	7.4	20.2	7.8	3	21 1/2
Alamo River	30.1	6.5	—	—	8.0	2	25
Conejos River	24.4	6.2	9.0	19.7	9.8	2	21
Culebra River	22.0	4.8	5.6	15.1	6.8	1	22
Rio Grande (N.M.)	17.6	4.0	5.0	9.0	5.1	14	23
Chama River	26.0	5.4	8.1	15.9	8.2	5	21
Pecos River	10.6	2.5	5.1	4.0	3.7	3	24
Canadian River	17.6	4.0	4.8	9.0	5.1	3	23

*Some for shorter periods

P R E C I P I T A T I O N D A T A

WATERSHED	STATE	Precipitation October 1 to January 31	Departure from Normal Inches	Precipitation January Inches	Departure from Normal Inches	
					Normal	Normal
Canadian	New Mexico	3.58	+0.37	0.40	-0.10	-0.10
Rio Grande	Colorado	2.65	+0.41	0.21	-0.23	-0.23
Rio Grande (N)	New Mexico	4.66	+0.12	0.62	-0.70	-0.70
Rio Grande (S)	New Mexico	1.06	-1.17	0.10	-0.32	-0.32
Pecos	New Mexico	1.54	-1.11	0.23	-0.23	-0.23

* Average of Selected High Elevation Stations

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RIO GRANDE DRAINAGE SNOW SURVEYS
February 1, 1954

Drainage Basin and Snow Course	No. and State	Elev.	Snow Cover Measurements						Years of Record	
			1954			Past Record				
			Date of Survey	Snow Depth (In.)	Water Content (In.)	Water Content (In.)	1952	Average		
RIO GRANDE IN COLORADO										
Wolf Creek Pass	26 Colo.	10000	1/29	61.3	13.3	14.4	42.0	14.5	14	
Upper Rio Grande	27 "	9350	1/31	24.3	5.5	4.6	10.7	5.2	14	
Silver Lakes	47 "	9600	1/30	13.2	2.6	2.7	15.0	4.6	14	
River Springs	49 "	9300	2/1	14.7	2.9	4.1	17.7	5.9	13	
La Veta Pass #2	74 "	9300	2/1	20.3	6.1	6.9	15.8	5.7	14	
Summitville (a)	76 "	11500	1/29	47.0	9.5	--	--	11.3	9	
Cumbres Pass #2(a)	77 "	10000	1/28	34.0	6.8	14.0	21.6	13.7	15	
Santa Maria	80 "	9700	2/1	12.1	3.1	3.3	7.9	3.7	15	
Culebra	82 "	10000	1/30	22.0	4.8	5.6	15.1	6.8	14	
Ft. Garland	84 "	8200	1/30	8.7	1.5	2.1	4.1	1.8	13	
Cochetopa Pass	126 "	10000	2/1	12.2	5.1	2.3	5.6	3.4	5	
Howardville	151 "	9800	1/30	29.3	7.3	7.2	17.5	3.3	3	
Wolf Creek Summit	155 "	11100	1/30	61.6	12.3	13.9	40.4	3.3	3	
Average for drainage				24.5	5.9	6.0	15.6	6.8		
UPPER RIO GRANDE										
Wolf Creek Pass	26 Colo.	10000	1/29	61.3	12.3	14.4	42.0	14.5	14	
Upper Rio Grande	27 "	9350	1/31	24.3	5.5	4.6	10.7	5.2	14	
Santa Maria	80 "	9700	2/1	12.1	3.1	3.3	7.9	3.7	15	
Average for drainage				32.6	7.0	7.4	20.2	7.8		
ALAMOSA RIVER										
Silver Lakes	47 Colo.	9600	1/30	13.2	2.6	2.7	15.0	4.6	14	
Summitville (a)	76 "	11500	1/29	47.0	10.3	--	--	11.3	9	
Average for drainage				30.1	6.5	--	--	8.0		
CONEJOS RIVER										
River Springs	49 Colo.	9300	2/1	14.7	2.9	4.1	17.7	5.9	13	
Cumbres Pass #2(a)	77 "	10000	1/28	34.0	9.5	14.0	21.6	13.7	15	
Average for drainage				24.4	6.2	9.0	19.7	9.8		
CULEBRA RIVER										
Culebra	82 Colo.	10000	1/30	22.0	4.8	5.6	15.1	6.8	14	

(a) Air Observed

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RIO GRANDE DRAINAGE SNOW SURVEYS
February 1, 1954

Drainage Basin and Snow Course	No. and State	Elev.	Snow Cover Measurements						Years of Record
			1954			Past Record			
			Date of Survey	Snow Depth (In.)	Water Content (In.)	Water Content (In.)	1953	1952	Average
RIO GRANDE IN NEW MEXICO									
Red River	1 N.M.	9500	1/29	18.0	4.2	4.1	12.8	5.4	14
Taos Canyon	2 "	9000	1/28	12.3	3.6	4.6	8.4	5.1	14
Aspen Grove	4 "	9100	1/30	12.5	2.7	4.1	3.4	3.9	15
Hematite Park*	9 "	9500	1/28	18.5	4.0	3.9	7.1	3.7	13
Tres Ritos	12 "	9000	2/1	14.7	3.0	3.8	7.5	4.4	15
Pay Role (a)	15 "	9700	1/27	25.0	5.4	5.0	16.5	7.0	13
Chama Divide	17 "	7750	1/30	16.5	4.1	4.2	7.7	4.4	14
Chamita	18 "	8500	1/30	22.8	4.8	7.4	18.3	7.1	12
Cordova (a)	19 "	10100	1/29	23.0	5.7	6.6	12.2	7.1	12
Panchuela #2	20 "	8300	1/29	8.1	1.8	4.0	3.5	3.1	15
Big Tesuque	21 "	10000	1/30	11.2	3.0	1.2	5.2	4.2	12
Elk Cabin	24 "	8350	1/30	10.5	3.1	2.7	2.5	2.6	6
Rio En Medio	26 "	10400	1/29	21.0	4.6	7.8	5.9	4.7	4
Bateman	29 "	9300	1/29	31.8	6.0	10.0	15.4	8.9	4
Fenton Hill	31 "	8900	1/31	9.2	2.3	4.1	5.2		2
Average for Drainage				17.6	4.0	5.0	9.0	5.1	
CHAMA RIVER									
Cumbres Pass #2(a)	77 Colo.	10000	1/28	34.0	6.8	14.0	21.6	13.7	15
Pay Role (a)	15 N.Mex.	9700	1/27	25.0	5.4	5.0	16.5	7.0	13
Chama Divide	17 "	7750	1/30	16.5	4.1	4.2	7.7	4.4	14
Chamita	18 "	8500	1/30	22.8	4.8	7.4	18.3	7.1	12
Bateman	29 "	9300	1/29	31.8	6.0	10.0	15.4	8.9	4
Average for drainage				26.0	5.4	8.1	15.9	8.2	
PECOS RIVER									
Aspen Grove*	4 N.M.	9500	1/30	12.5	2.7	4.1	3.4	3.9	15
Panchuela	20 "	9200	1/29	8.1	1.8	4.0	3.5	3.1	15
Big Tesuque*	21 "	900	1/30	11.2	3.0	1.2	5.2	4.2	12
Average for drainage				10.6	2.5	3.1	4.0	3.7	
CANADIAN RIVER									
Hematite Park	9 N.M.	9500	1/28	18.5	4.0	3.9	7.1	3.7	13
Tres Ritos*	12 "	9000	2/1	14.7	3.0	3.8	7.5	4.4	15
Cordova*(a)	19 "	10100	1/29	23.0	5.7	6.6	12.2	7.1	12
Average for drainage				17.6	4.0	4.8	9.0	5.1	

*On adjacent drainage

(a) Air Observed

APPENDIX C. *ANALYSIS OF DATA*

ANALYSIS OF DATA WITH THE *ANALYST* PROGRAM

LIST AND LOCATION OF SNOW COURSES

Platte, Arkansas, Colorado
and Rio Grande Drainages

No.	Name	Sec.	Twp.	Rge.	Elev.	No.	Name	Sec.	Twp.	Rge.	Elev.
1 SD	<u>Cheyenne</u> Upper Spearfish	21	3N	1E	6500	12 C	<u>Upper Colorado</u> Phantom Valley	7	5N	75W	9300
7 C	<u>North Platte</u> Party View	24	5N	78W	9200	16 C	Berthoud Pass	35	2S	75W	9700
8 C	Columbine	21	5N	82W	9300	59 C	M. F. Camp Ground	16	3S	77W	9000
106 C	Northgate	7	11N	79W	8500	64 C	W. Inlet Grand Lake	26	4N	75W	9000
7 W	Bottie Creek	24	14N	85W	8200	65 C	Lulu Irene	8	5N	75W	10500
8 W	Webber Spring	27	14N	85W	9000	69 C	Arrow	34	1S	75W	9900
9 W	Old Battle	29	14N	85W	9800	70 C	Lapland	16	2S	76W	9500
37 W	North French Creek	27	16N	80W	10200	79 C	Fremont Pass	2	8S	76W	11400
38 W	North Barrett Creek	30	16N	80W	9400	91 C	Lynx Pass	27	2N	88N	9100
39 W	Ryan Park	34	16N	81W	8400	96 C	Shrine Pass	15	6S	79W	10500
67 W	Spring Creek	32	15N	85W	9000	97 C	Grizzly Peak	2	5S	76W	11250
68 W	Albany	18	14N	78W	9400	102 C	Glen-Mar Ranch	31	2S	77W	8850
71 W	Pearl	18	12N	82W	8900	106 C	Monarch Lake	30	2N	74W	8500
	<u>Laramie</u>					112 C	Granby	11	2N	77W	8700
88 C	Roach	5	10N	77W	9800	127 C	Grand Lake	36	4N	75W	9600
111 C	McIntyre	35	10N	76W	9100	138 C	Berthoud Summit	10	2S	75W	11300
3 W	Brooklyn Lake	11	16N	78W	10200	139 C	Frazer View	34	2S	75W	10600
11 W	Foxpark	21	13N	78W	9200	143 C	Gore Pass	2	1N	82W	9900
35 W	Libby Lodge	29	16N	78W	8700	146 C	Frisco	16	6S	78W	9300
36 W	Hairpin Turn	24	16N	79W	9500	147 C	Snake River	9	5S	76W	9700
	<u>Sweetwater</u>					158 C	Summit Ranch	8	4S	78W	10000
29 W	Grannier Meadows	19	30N	100W	9000	163 C	Vail Pass	28	5S	79W	10000
47 W	South Pass	13	30N	101W	9000	167 C	Kokomo	23	7S	79W	10600
57 W	Larson Creek	12	30N	103W	9000	168 C	Land	10	7S	80W	9500
	<u>Laramie Peaks District</u>					33 C	<u>Roaring Fork</u> Ind. Pass Tunnel	30	11S	82W	10700
32 W	La Bonte	11	27N	74W	8450	34 C	North Lost Trail	20	11S	87W	9200
70 W	Boxelder	31	30N	75W	9000	45 C	Nast	1	9S	83W	8700
	<u>South Platte</u>					100 C	Ivanhoe	12	9S	82W	10400
1 C	Cameron Pass	2	6N	76W	10300	144 C	Ruby	1	12S	83W	11500
2 C	Chambers Lake	6	7N	75W	9000						
3 C	Big South	33	8N	75W	8600						
5 C	East Portal	2	2S	74W	9400						
14 C	Hoosier Pass	13	8S	78W	11400						
15 C	Fairplay	33	9S	77W	10000						
41 C	Wild Basin	24	3N	74W	10000						
50 C	Deadman Hill	26	10N	75W	10200						
60 C	University Camp	26	1N	73W	10300						
61 C	Loveland Pass	27	4S	76W	10600						
68 C	Hour Glass Lake	18	7N	73W	9500						
83 C	Jefferson Creek	14	7S	76W	10100						
95 C	Hidden Valley	23	5N	75W	9550						
115 C	Deer Ridge	19	5N	78W	9050						
116 C	Copeland Lake	21	3N	78W	8600						
117 C	Empire	21	3S	75W	9650						
118 C	Geneva Park	18	6S	74W	9750						
120 C	Antero	1	13S	77W	9200						
128 C	Red Feather	26	10N	74W	9000						
133 C	Moffatt	2	2S	74W	9400						
134 C	Ward	1	1N	78W	9500						
137 C	Berthoud Falls	16	3S	75W	10500						
148 C	Longs Peak	32	4N	78W	10500						
156 C	Lost Lake	32	8N	75W	9300						
34 C	Pole Mountain	35	15N	72W	8700						
	<u>Arkansas River</u>					153 C	<u>Plateau Creek</u> Mesa Lakes	35	11S	96W	10000
19 C	Tennessee Pass	21	8S	80W	10200						
21 C	Twin Lakes Tunnel	22	11S	82W	10500						
72 C	Whiskey Creek		37-2N	105W	10300	29 C	<u>San Juan</u> Upper San Juan	10	37N	1E	10000
74 C	La Veta Pass	22	28S	70W	9300	30 C	Silverton	10	41N	7W	9400
78 C	Four Mile Park	23	11S	81W	9700	31 C	Cascade	12	39N	9W	8850
81 C	Blue Lakes	30	31S	69W	10000	155 C	La Plata	4	36N	11W	9700
92 C	Monarch Pass	16	49N	6E	10500	149 C	Spud Mountain	32	40N	8W	10700
119 C	Saint Elmo	31	15S	80W	10600	150 C	Molas Lake	7	40N	7W	10500
121 C	Timberline	8	9S	81W	11100	151 C	Howardville	15	41N	7W	9800
165 C	Cooper Hill	2	8S	80W	10600	152 C	Mineral Creek	36	42N	8W	10300
166 C	East Fork	9	8S	79W	10700						

LIST AND LOCATION OF SNOW COURSES (CONTINUED)

No.	Name	Sec.	Twp.	Rge.	Elev.	No.	Name	Sec.	Twp.	Rge.	Elev.
<u>Dolores</u>											
23 C	Rico	11	39N	11W	8700	7 A	Iron Springs	22	14N	3W	6000
24 C	Telluride	6	42N	8W	8600	15 A	Willow Ranch	16	21N	11W	5000
25 C	Lizzard Head	24	41N	10W	10300						
114 C	Trout Lake	8	41N	9W	9700	9 A	Chalendar	27	22N	3E	7100
<u>Green</u>											
23 W	Dutch Joe	33	31N	104W	8700	10 A	Grand Canyon	21	30N	4E	7500
24 W	Mulligan Park	17	35N	105W	8900	11 A	Bright Angel	34	33N	4E	8400
25 W	Kendall R. S.	23	38N	110W	7900						
26 W	Loomis Park	14	37W	111W	8500	26 C	Rio Grande	4	37N	2E	10000
27 W	Snyder Basin	15	29N	114W	8040	27 C	Wolf Creek	13	40N	4W	9350
28 W	Piney La Barge	19	29N	114W	8820	47 C	Upper Rio Grande	15	36N	5E	9600
<u>Arizona (Lower Colorado)</u>											
23 W	Dutch Joe	33	31N	104W	8700	49 C	Silver Lakes	15	33N	6E	9300
24 W	Mulligan Park	17	35N	105W	8900	49 C	River Springs	25	33N	4E	9300
25 W	Kendall R. S.	23	38N	110W	7900	76 C	Summitville	30	37N	4E	11500
26 W	Loomis Park	14	37W	111W	8500	77 C	Cumbres Pass	17	32N	5E	10000
27 W	Snyder Basin	15	29N	114W	8040	80 C	Santa Maria	8	41N	2W	9700
28 W	Piney La Barge	19	29N	114W	8820	82 C	Culebra				
<u>Arizona (Gila)</u>											
11 NM	Frisco Divide	21	6S	20W	8000	108 C	Fort Garland	13	29N	72W	8200
14 NM	State Line	5	6S	21W	8000	109 C	Platoro	22	36N	4W	9950
22 NM	Taylor Creek	20	10S	10W	7850	110 C	West Conejos	25	35N	4E	9450
23 NM	Inman	6	11S	10W	7800	111 C	La Manga	11	33N	5E	10000
1 A	Nutrioso	23	6N	30E	8500	112 C	Pyramid	26	41N	5W	10300
2 A	Beaver Head	13	4N	30E	8000	122 C	Spring Creek Pass	2	42N	3W	10900
3 A	Coronado Trail	26	5N	30E	8000	123 C	Pool Table Mt.	19	41N	2E	10000
29 A	Rose Canyon	15	12S	16E	7300	124 C	Lake Humphrey	32	40N	1E	9300
30 A	Bear Wallow	6	12S	16E	8100	126 C	Cochetopa Pass	12	45N	3E	10000
<u>Arizona (Salt)</u>											
4 A	McNary	14	8N	23E	7200	154 C	Porcupine	2	41N	3W	10400
5 A	Forest Dale	2	9N	21E	6000	155 C	Wolf Creek Summit	6	37N	2E	11000
6 A	Milk Ranch	28	8N	23E	7000						
20 A	Pacheta				7800						
21 A	Fort Apache	18	7N	27E	9000	1 NM	Red River	29	28N	15E	9500
22 A	Baldy	28	7N	27E	9000	2 NM	Taos Canyon	10	25N	15E	9000
23 A	Maverick Fork	13	6N	27E	9050	4 NM	Aspen Grove	12	18N	10E	9100
31 A	Workman Creek	33	6N	14E	5860	9 NM	Hematite Park	8	28N	15E	9500
<u>Arizona (Little Colorado)</u>											
12 A	Fort Valley	22	22N	6E	7350	12 NM	Tres Ritos	23	22N	13E	9000
13 A	Mormon Lake	13	18N	8E	7350	15 NM	Payrole	16	28N	7E	9700
19 A	Mormon Mountain	14	18N	8E	7500	17 NM	Chama Divide				
<u>Arizona (Verde)</u>											
8 A	Camp Wood	3	16N	6W	5700	24 NM	Big Tesuque	17	18N	11E	10000
16 A	Antelope Park	29	19N	8E	7300	24 NM	Elk Cabin	8	18N	11E	8250
17 A	Casner Park	19	18N	8E	6930	26 NM	Rio En Medio	8	18N	11E	10400
18 A	Munds Park	7	18N	7E	6500	28 NM	Quemazon	34	20N	5E	9300
						29 NM	Bateman	5	26N	6E	9300
						31 NM	Fenton Hill	18	19N	3W	8900

SD - South Dakota; C - Colorado; W - Wyoming; A - Arizona; NM - New Mexico

Federal - State - Private
COOPERATIVE SNOW SURVEYS

Furnishes the basic data necessary for forecasting water supply for irrigation, domestic and municipal water supply, hydro-electric power generation, navigation, mining and industry

“WATER IS THE WEST’S GREATEST RESOURCE”